

REMARKS

I. Status of the Claims

Claims 33-36, 38-46, 59 and 60 are pending in this application. Claims 33, 59 and 60 are independent claims. Claims 1-32 and 47-58 were previously canceled pursuant to a restriction requirement. Claim 37 (which was indicated as being allowable) has been canceled, and the limitations of that claim have been incorporated into Claim 33. New independent claims 59 and 60 are believed to be allowable based on the allowable subject matter identified in the Office Action. Pursuant to a request for continued examination (RCE) being submitted herewith, entry of the foregoing amendment and reconsideration on the merits of the pending claims are respectfully requested.

II. Allowable Subject Matter

In the Office Action, Claims 36, 37 and 39-42 were indicated as being allowable if rewritten in independent form, including all of the limitations of the base claim and any intervening claims. In response, Claim 33 has been amended to incorporate the subject matter of Claim 37.

The allowable subject matter in claim 37 (now incorporated into claim 33) is a valve system that allocates pressure applied to the edible piece at and between the print stations. Applicants submit that several means are disclosed in the specification for applying pressure to the edible piece at the print stations and between the stations (especially those means disclosed at pages 26 through page 30 of the specification) and that an invention incorporating these means without reciting the particulars of a “valve system” should be patentable.

The other changes that have also been made to claim 33 are for the purpose of improving clarity and do not affect the indication of allowable subject matter. For example, it is specified that an ink image is applied at each print station instead of merely being “formed” (which it is argued at page 3 of the Office Action could encompass etching or engraving, for example). Further, the language is made consistent so that “component” images applied at the first and second print stations, together form the “registered” image recited in the preamble. Various methods for “applying” an ink image are described page 21, line 20 to page 22, line 26. The formation of registered images from successively applied component images is described throughout the specification, for example at page 14, lines 10-15. No new matter has been added.

III. Rejections Under 35 U.S.C. § 103

Claims 33-35 and 45 were rejected under 35 U.S.C. § 103(a) over WO 91/01884 (“WO ‘884”) in view of U.S. Patent No. 6,267, 997 to Ream (“Ream”). Claim 38 was rejected over WO ‘884 and Ream, further in view of U.S. Patent No. 5,423,252 to Yamamoto. Claim 43 was rejected over WO ‘884 and Ream, further in view of U.S. Patent No. 2,613,594 to Emerson. Claim 44 was rejected over WO ‘884 and Ream, further in view of U.S. Patent No. 4,619,196 to Matsuoka. Claim 46 was rejected over WO ‘884 and Ream, further in view of U.S. Patent No. 4,905,589 (Ackley). Applicants respectfully submit that the rejections are moot in view of the foregoing amendment incorporating allowable subject matter into the independent claims. In any event, Applicants traverse each of these rejections as follows.

It may be noted that there is no example in the record, or known in the prior art, of an edible item having a composite image formed of multiple composite images printed on a non-planar surface thereof.

WO '884 discloses an apparatus for etching an image such as the Motrin® brand name on a pharmaceutical tablet (See Fig. 3). The image in Fig. 3, does not comprise a "registered" image as there is only a single image element. Background (12) (which is the only ink indicia formed on the surface) is merely a "geometric shape" (see pages 6-7). The actual Motrin® figure (13) is then etched into the background (12). Thus, element (12) is not meaningfully "registered" with element (13), to form a registered image.

Further, WO '884 does not disclose two printing steps. Element 41 is a laser etch station. Aside from not being able to apply a second color (which of course a laser etch cannot do), the piece is not contacted by an ink roller or other member at that position, so that maintaining its position is not an issue as in the present context. The amendment above should address the issue raised by the examiner, that an etching station could be construed to fall within one or the other claimed printing station.

Critically important from the perspective of 35 U.S.C. § 103, WO '884 specifically teaches that sharp images cannot be formed on a non-planar surface of a tablet using an offset printer. That is why WO '884 uses etching. See page 3, lines 20-31, where WO '884 enumerates the drawbacks of printing, and page 4, lines 25-29, where one of the objects of the invention is stated as "creation of much more distinctive and unique markings than would otherwise be possible using solely offset printing techniques."

Simply put, one of ordinary skill in the art would not pick up WO '884 and surmise that component images could be successively printed on a non planar surface of an edible to form a composite image, with any reasonable expectation of success.

Ream is used by the Examiner to provide the elements lacking from WO '884, but clearly does not provide the motivation to make the modifications suggested in the Office Action. The international application corresponding to Ream is discussed in the specification in the paragraph bridging pages 4 and 5. As discussed therein, Ream discloses printing registered images on edible substrates, but does not disclose an apparatus for transporting individual shaped pieces as claimed. The edible substrates in Ream are large, flat sheets **22** of chewing gum (i.e., most preferably 10 inches wide and 4-1/2 inches long, length being measured in the traveling direction of the sheet, see e.g. col. 5, lines 56-65). Clearly, printing on a flat sheet does not raise the same issues as printing on a shaped piece, as a sheet would not be subject to lateral, longitudinal or rotational movement.

Further, according to Ream, the sheets are positioned in recesses **14**, which are larger than the sheets, and about the same thickness as the sheets (see page 14, line 24), preferably a little deeper (i.e., preferably 1/16 inch, compared to the 0.06 inch "ideal" thickness of the sheet, see col. 10, lines 34-37 and col. 5, line 48). These recesses do not securely hold pieces in registration. In fact, according to the passage cited in the Office Action, at col. 8, line 47-50, the sheets of gum are actually moved by guide rail **69** while the sheets are in the recess, which shows that the recesses do not correspond to the shape of the pieces, as set forth in the claims.

As is made clear from the prior art cited in the Office Action, one of ordinary skill in the art at the time the present invention was made, understood that specialized apparatus are required to convey individual shaped pieces having non planar surfaces (*see, e.g.*, Yamamoto, Matsuoka, Ackley, all of record). Therefore, it would not have been obvious from the teaching of Ream, which discloses conveying and printing on flat pieces, that printing of composite images could be done on non planar surfaces conveyed in individual recesses, as presently claimed.

Matsuoka, which does not disclose two printing stations, does not overcome the deficiencies of Ream. The Office Action relies on Matsuoka to teach a vacuum system for holding individual pieces in registration. However, Matsuoka merely teaches a vacuum drum, and the pieces are not held in place between printing steps. Further, it is clear from the Figures in Matsuoka that the recesses are large relative to the pieces, and that Matsuoka contemplates substantial movement of the pieces in the recesses. Thus, the reference does not teach that the pieces are held in registration as claimed.

The motivation to combine Matsuoka with Ream is also lacking. The references address two different types of substrates, sheets of chewing gum and tablets, and the methods disclosed are inseparable from the means used to convey the pieces. Thus, it would not have been obvious to utilize a conveying means from one reference and use it in an apparatus designed for a different purpose.

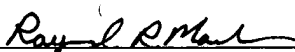
Yamamoto discloses a chain or belt conveyor for conveying tablets which is also provided with vacuum (Yamamoto, col. 6, lines 25-26). However, Yamamoto, as with Matsuoka, does not disclose means to hold pieces in registration between two print

stations. Even if combined with Ream and Matsuoka, all of the elements are not found in the combination of references.

The other claims in this application not specifically addressed above are each dependent from one or another of the independent claims discussed above and are therefore believed patentable for the same reasons. Moreover, applicants addressed the merits of each of the secondary references at some length in the previous response, which remarks have not been addressed on the record. Since each dependent claim is also deemed to define an additional aspect of the invention, however, the individual reconsideration of the patentability of each on its own merits is respectfully requested.

Applicants' attorney of record may be reached in our New York office by telephone at (212) 218-2100. All correspondence should be directed to our below-listed address.

Respectfully submitted,



Raymond R. Mandra
Attorney for Applicants
Registration No. 34,382

FITZPATRICK, CELLA, HARPER & SCINTO
30 Rockefeller Plaza
New York, New York 10112-3801
Facsimile: (212) 218-2200

NY_Main 530869_1